

Elements of Differentiation

The biggest mistake of past centuries in teaching has been to treat all children as if they were variants of the same individual, and thus to feel justified in teaching them the same subjects in the same ways.

Howard Gardner (in Siegel & Shaughnessy, 1994)

Phi Delta Kappan

Most effective teachers modify some of their instruction for students some of the time. Many of those teachers also believe they differentiate instruction, and, to some degree, they do. It is not this book's goal, however, to recount the sorts of modifications sensitive teachers make from time to time, such as offering a student extra help during lunch or asking an especially able learner a challenging question during a review session. This book offers guidance for educators who want to develop and facilitate consistent, robust plans in anticipation of and in response to students' learning differences.

The Teacher Focuses on the Essentials

No one can learn everything in every textbook, let alone in a single subject. The brain is structured so that even the most able of us will forget more than we remember about most topics. It is crucial, then, for teachers to articulate what's essential for learners to recall, understand, and be able to do in a given domain.

In a differentiated classroom, the teacher carefully fashions instruction around the essential concepts, principles, and skills of each subject. She intends that students will leave the class with a firm grasp of those principles and skills, but they *won't* leave with a sense that they have conquered all there is to know. The teacher's clarity ensures that struggling learners focus on essential understandings and skills; they don't drown in a pool of disjointed facts. Similarly, the teacher ensures that advanced learners spend their time grappling with important complexities rather than repeating work on what they already know. Clarity increases the likelihood that a teacher can introduce a subject in a way that each student finds meaningful and interesting. Clarity also ensures that teacher, learners, assessment, curriculum, and instruction are linked tightly in a journey likely to culminate in personal growth and individual success for each child.

The Teacher Attends to Student Differences

From a very young age, children understand that some of us are good with kicking a ball, some with telling funny stories, some with manipulating numbers, and some with making people feel happy. They understand that some of us struggle with reading words from a page, others with keeping tempers in check, still others with arms or legs that are weak.

Children seem to accept a world in which we are not alike. They do not quest for sameness, but they search for the sense of triumph that comes when they are respected, valued, nurtured, and even cajoled into accomplishing things they believed beyond their grasp.

In differentiated classrooms, the teacher is well aware that human beings share the same basic needs for nourishment, shelter, safety, belonging, achievement, contribution, and fulfillment. She also knows that human beings find those things in different fields of endeavor, according to different timetables, and through different paths. She understands that by attending to human differences she can best help individuals address their common needs. Our experiences, culture, gender, genetic codes, and neurological wiring all affect how and what we learn. In a differentiated classroom, the teacher unconditionally accepts students as they are, and she expects them to become all they can be.

Assessment and Instruction Are Inseparable

In a differentiated classroom, assessment is ongoing and diagnostic. Its goal is to provide teachers day-to-day data on students' readiness for particular ideas and skills, their interests, and their learning profiles. These teachers don't see assessment as something that comes at the end of a unit to find out what students learned; rather, assessment is today's means of understanding how to modify tomorrow's instruction.

Such formative assessment may come from small-group discussion with the teacher and a few students, whole-class discussion, journal entries, portfolio entries, exit cards, skill inventories, pre-tests, homework assignments, student opinion, or interest surveys. At this stage, assessment yields an emerging picture of who understands key ideas and who can perform targeted skills, at what levels of proficiency, and with what degree of interest. The teacher then shapes tomorrow's lesson—and even today's—with the goal of helping individual students move ahead from their current position of competency.

At benchmark points in learning, such as the end of a chapter or unit, teachers in differentiated classrooms use assessment to formally record student growth. Even then, however, they seek varied means of assessment so that all students can fully display their skills and understandings. Assessment always has more to do with helping students grow than with cataloging their mistakes.

The Teacher Modifies Content, Process, and Products

By thoughtfully using assessment data, the teacher can modify content, process, or product. *Content* is what she wants students to learn and the materials or mechanisms through which that is accomplished. *Process* describes activities designed to ensure that students use key skills to make sense out of essential ideas and information. *Products* are vehicles through which students demonstrate and extend what they have learned.

Students vary in readiness, interest, and learning profile. *Readiness* is a student's entry point relative to a particular understanding or skill. Students with less-developed readiness may need

- someone to help them identify and make up gaps in their learning so they can move ahead;
- more opportunities for direct instruction or practice;
- activities or products that are more structured or more concrete, with fewer steps, closer to their own experiences, and calling on simpler reading skills, or
- a more deliberate pace of learning.

Advanced students, on the other hand, may need

- to skip practice with previously mastered skills and understandings;
- activities and products that are quite complex, open-ended, abstract, and multifaceted, drawing on advanced reading materials; or
- a brisk pace of work, or perhaps a slower pace to allow for greater depth of exploration of a topic.

Interest refers to a child's affinity, curiosity, or passion for a particular topic or skill. One student may be eager to learn about fractions because she is very interested in music, and her math teacher shows her how fractions relate to music. Another child may find a study of the American Revolution fascinating because he is particularly interested in medicine and has been given the option of creating a final product on medicine during that period.

Learning profile has to do with how we learn. It may be shaped by intelligence preferences, gender, culture, or learning style. Some students need to talk ideas over with peers to learn them well. Others work better alone and with writing. Some students learn easily part-to-whole. Others need to see the big picture before specific parts make sense. Some students prefer logical or analytical approaches to learning. Other classmates prefer creative, application-oriented lessons. (See the Appendix and the end of this chapter for sources to learn more about readiness, interest, and learning profile.)

Teachers may adapt one or more of the curricular elements (content, process, products) based on one or more of the student characteristics (readiness, interest, learning profile) at any point in a lesson or unit. However, you need not differentiate all elements in all possible ways. Effective differentiated classrooms include many times in which whole-class, nondifferentiated fare is the order of the day. Modify a curricular element only when (1) you see a student need and (2) you are convinced that modification increases the likelihood that the learner will understand important ideas and use important skills more thoroughly as a result.

All Students Participate in Respectful Work

In differentiated classrooms, certain essential understandings and skills are goals for all

learners. However, some students need repeated experiences to master them, and other students master them swiftly. The teacher in a differentiated classroom understands that she does not show respect for students by ignoring their learning differences. She continually tries to understand what individual students need to learn most effectively, and she attempts to provide learning options that are a good fit for each learner whenever she can. She shows respect for learners by honoring both their commonalities and differences, not by treating them alike.

For example, some students grasp an idea best when they see it directly tethered to their own lives and experiences. Others can think about the idea more conceptually. Some students strive for accuracy and eschew the uncertainty of creativity. Others thirst for the adventure of divergence and deplore the tedium of drill. Some students want to sing their understanding of a story, some want to dance the story's theme, some want to draw it, and some want to write to the author or a character.

In the end, it is not standardization that makes a classroom work. It is a deep respect for the identity of the individual. A teacher in a differentiated classroom embraces at least the following four beliefs.

- Respect the readiness level of each student.
- Expect all students to grow, and support their continual growth.
- Offer all students the opportunity to explore essential understandings and skills at degrees of difficulty that escalate consistently as they develop their understanding and skill.
- Offer all students tasks that look—and are—equally interesting, equally important, and equally engaging.

The Teacher and Students Collaborate in Learning

Teachers are the chief architects of learning, but students should assist with the design and building. It is the teacher's job to know what constitutes essential learning, to diagnose, to prescribe, to vary the instructional approach based on a variety of purposes, to ensure smooth functioning of the classroom, and to see that time is used wisely. Nonetheless, students have much to contribute about their understanding.

Students can provide diagnostic information, develop classroom rules, participate in the governing process grounded in those rules, and learn to use time as a valuable resource. Students can let teachers know when materials or tasks are too hard or too easy, when learning is interesting (and when it isn't), when they need help, and when they are ready to work alone. When they are partners in shaping all parts of the classroom experience, students develop ownership in their learning and become more skilled at understanding themselves and making choices that enhance their learning.

In a differentiated classroom, the teacher is the leader, but like all effective leaders, she attends closely to her followers and involves them thoroughly in the journey. Together,

teacher and students plan, set goals, monitor progress, analyze success and failures, and seek to multiply the success and learn from failures. Some decisions apply to the class as a whole. Others are specific to an individual.

A differentiated classroom is, of necessity, student-centered. Students are the workers. The teacher coordinates time, space, materials, and activities. Her effectiveness increases as students become more skilled at helping one another and themselves achieve group and individual goals.

The Teacher Balances Group and Individual Norms

In many classrooms, a student is an "unsuccessful" 5th grader if he falls short of 5th grade "standards." That the student grew more than anyone in the room counts for little if he still lags behind grade-level expectations. Similarly, a child is expected to remain in 5th grade even though she achieved those standards two years ago. About that student we often say, "She's fine on her own. She's already doing well."

Teachers in a differentiated classroom understand group norms. They also understand individual norms. When a student struggles as a learner, the teacher has two goals. One is to accelerate the student's skills and understanding as rapidly as possible for that learner, still ensuring genuine understanding and meaningful application of skills. The second is to ensure that the student and parents are aware of the learner's individual goals and growth and the student's relative standing in the class. The same is true when a learner has advanced beyond grade-level expectations.

A great coach never achieves greatness for himself or his team by working to make all his players alike. To be great, and to make all his players great, he must make each player the best that he or she possibly can be. No weakness in understanding or skill is overlooked. Every player plays from his or her competencies, not from a sense of deficiency. There is no such thing as "good enough" for any team member. In an effectively differentiated classroom, assessment, instruction, feedback, and grading take into account both group and individual goals and norms.

The Teacher and Students Work Together Flexibly

As in an orchestra composed of individuals, varied ensemble groups, sections, and soloists, the differentiated classroom is built around individuals, various small groups, and the class as a whole. They all work to "learn and play the score," albeit with varied instruments, solo parts, and roles in the whole.

To address the various learning needs that make up the whole, teachers and students work together in a variety of ways. They use materials flexibly and employ flexible pacing. Sometimes the entire class works together, but sometimes small groups are more effective.

Sometimes everyone uses the same materials, but it is often effective to have many materials available. Sometimes everyone finishes a task at 12:15, but often some students finish a task while others need additional time for completion. Sometimes the teacher says who will work together. Sometimes students make the choice. When the teacher decides, she may do so based on similar readiness, interest, or learning profile needs. Sometimes assignment to tasks is random. Sometimes the teacher is the primary helper of students. Sometimes students are one another's best source of help.

In a differentiated classroom, the teacher also draws on a wide range of instructional strategies that help her focus on individuals and small groups, not just the whole class. Sometimes she finds learning contracts helpful in targeting instruction; at other times, independent investigations work well. The goal is to link learners with essential understandings and skills at appropriate levels of challenge and interest.

Two Organizers for Thinking About Differentiation

Figure 2.1 presents an organizer for thinking about differentiation, and it is a way of thinking about this book as well. In a differentiated classroom, a teacher makes consistent efforts to respond to students' learning needs. She is guided by general principles of facilitating a classroom in which attention to individuals is effective. Then she systematically modifies content, process, or product based on students' readiness for the particular topic, materials, or skills; personal interests; and learning profiles. To do so, she calls upon a range of instructional and management strategies.

The teacher does not try to differentiate everything for everyone every day. That's impossible, and it would destroy a sense of wholeness in the class. Instead, the teacher selects moments in the instructional sequence to differentiate based on formal or informal assessment. She also selects a time in her teaching plans to differentiate by interest so that students can link what is being studied to something that is important to them. She often provides options that make it natural for some students to work alone and others together, for some to have a more hands-on approach to making sense of ideas and for others to arrive at learning in a visual way. Differentiation is an organized yet flexible way of proactively adjusting teaching and learning to meet kids where they are and help them to achieve maximum growth as learners.

All classrooms are multifaceted. A differentiated classroom, however, differs in key ways when compared with traditional classrooms. Figure 2.2 (p. 16) suggests some ways in which the two approaches to teaching may vary. Feel free to add your own comparisons to the chart as you think about your own classroom and as you read through the rest of the book. Remember that there is much middle ground between an absolutely traditional classroom and an absolutely differentiated one (assuming either extreme could ever exist). For an interesting self-assessment, think of the two columns in the chart as continuums. Place an X on each continuum where you believe your teaching is now, and place an X on where you'd like it to be.

For More Information

To learn more about the concept of differentiating instruction through readiness, interest, and learning profile, see the Appendix and the following sources:

Kiernan, L. (producer) (1997). *Differentiating instruction: A video staff development set*. Alexandria, VA: ASCD.

Tomlinson, C. (1995). *How to differentiate instruction in mixed ability classrooms*. Alexandria, VA: ASCD.

Tomlinson, C. (1996). Good teaching for one and all: Does gifted education have an instruction identity? *Journal for the Education of the Gifted*, 20, 155-174.

Tomlinson, C. (1996). *Differentiating instruction for mixed-ability classrooms*. [An ASCD professional inquiry kit]. Alexandria, VA: ASCD.

Figure 2.1
Differentiation of Instruction

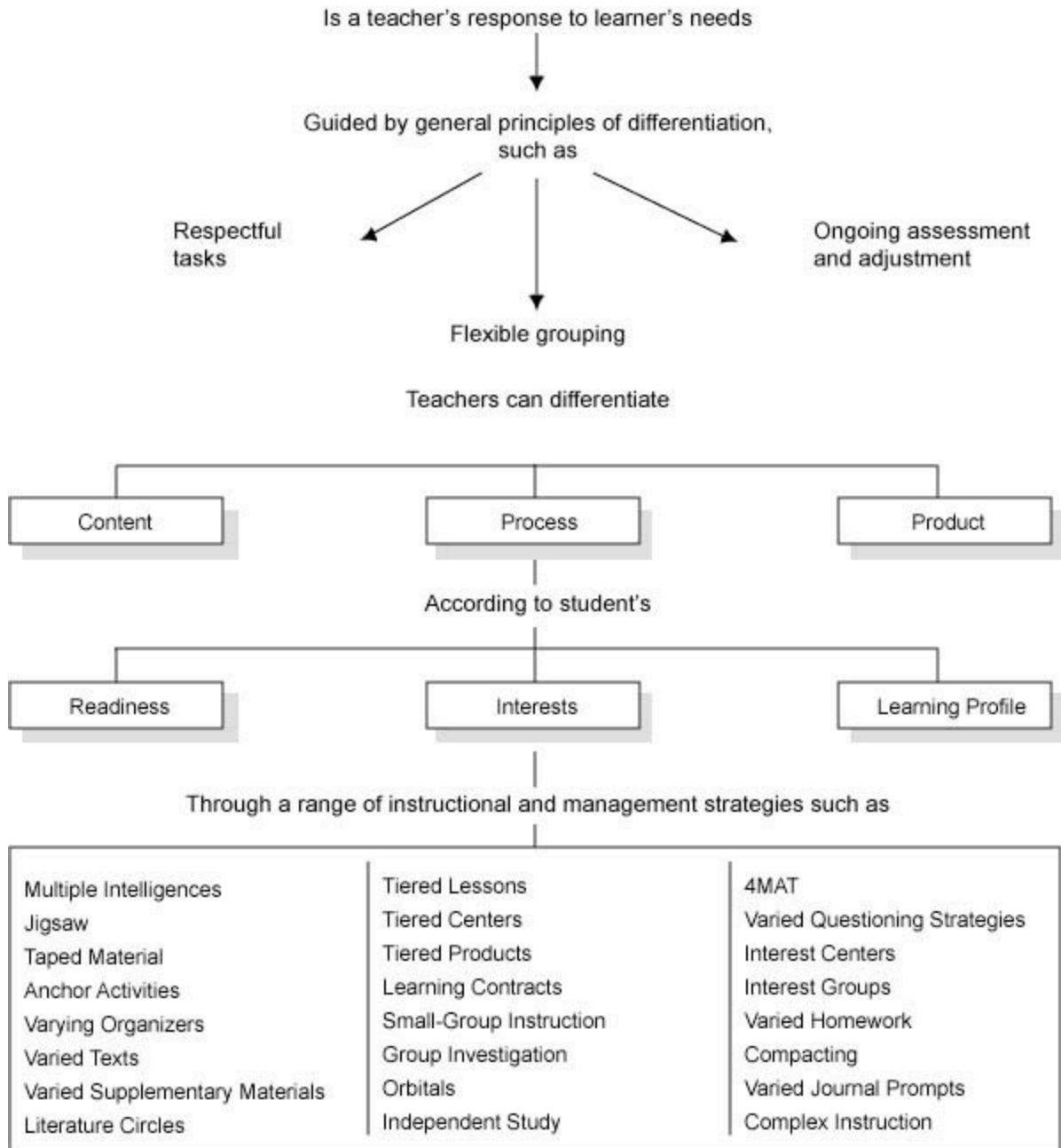


Figure 2.2
Comparing Classrooms

Traditional Classroom

- Student differences are

Differentiated Classroom

- Student differences are studied as a

masked or acted upon when problematic

- Assessment is most common at the end of learning to see "who got it"
- A relatively narrow sense of intelligence prevails
- A single definition of excellence exists
- Student interest is infrequently tapped
- Relatively few learning profile options are taken into account
- Whole-class instruction dominates
- Coverage of texts and curriculum guides drives instruction
- Mastery of facts and skills out-of-context are the focus of learning
- Single option assignments are the norm
- Time is relatively inflexible
- A single text prevails
- Single interpretations of ideas and events may be sought
- The teacher directs student behavior
- The teacher solves problems
- The teacher provides whole-class standards for grading
- A single form of assessment is often used

basis for planning

- Assessment is ongoing and diagnostic to understand how to make instruction more responsive to learner need
- Focus on multiple forms of intelligences is evident
- Excellence is defined in large measure by individual growth from a starting point
- Students are frequently guided in making interest-based learning choices
- Many learning profile options are provided for
- Many instructional arrangements are used
- Student readiness, interest, and learning profile shape instruction
- Use of essential skills to make sense of and understand key concepts and principles is the focus of learning
- Multi-option assignments are frequently used
- Time is used flexibly in accordance with student need
- Multiple materials are provided
- Multiple perspectives on ideas and events are routinely sought
- The teacher facilitates students' skills at becoming more self-reliant learners
- Students help other students and the teacher solve problems
- Students work with the teacher to establish both whole-class and individual learning goals
- Students are assessed in multiple ways

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